

Amendments to the Claims

This listing of claims replaces prior versions:

Claims 1-3 (canceled)

Claim 4 (currently amended): An electric device, comprising:

a plurality of battery units detachably mounted thereon, each battery unit constituted by pairing a storage battery pack with a memory for storing at least information about charge and discharge states of the storage battery pack;

connectors provided on said each battery unit ~~and a battery unit installation section on a device main body side, for performing electrical connection/disconnection to/from other elements of said electric device the device main body side incident to attachment/detachment of said battery unit;~~

a driver for driving a load and a controller for controlling supply of electric power from said each battery unit ~~through said connectors~~ to said driver by referring to the information stored in said memory of said each mounted battery unit, ~~which are provided on said device main body side; and~~

a charger for charging said storage battery pack ~~through said connectors~~ by referring to the information stored in said memory of said each battery unit, ~~which is provided on said device main body side or in said each battery unit,~~

wherein said charger includes means for reading at least [[an]] information about charge and discharge states of the storage battery pack stored in said memory of said each battery unit, and means for writing into said memory at least the information about charge and discharge states of said storage battery pack in the same unit.

Claim 5 (previously presented): An electric device according to claim 4,

wherein said charger is provided in said each battery unit, and said charger has means for deciding a charge order by mutually referring to the information stored in said memory of said each mounted battery unit.

Claim 6 (currently amended): An electric device according to claim 4, wherein a switch connected to said storage battery pack in series is provided in said each battery units,

said charger is means for charging said each storage battery pack through said switch by referring to the information stored in said memory of said each battery unit ~~and provided on said device main body side~~, and

said controller is means for controlling supply of electric power from said storage battery pack to said driver through said switch of said each battery unit by referring to the information stored in said memory of said each battery unit.

Claim 7 (currently amended): An electric device according to claim 4, wherein said charger is constituted to be a unit attachable/detachable to/from said electric device main body, ~~and is provided on said device main body side~~.

Claim 8 (original): An electric device according to claim 6, wherein said charger is constituted to be a unit attachable/detachable to/from said electric device main body.

Claim 9 (canceled)

Claim 10 (previously presented): An electric device according to claim 4, wherein said controller has means for reading the information stored in said memory of said each battery unit to control action of the whole device.

Claim 11 (previously presented): An electric device according to claim 4, wherein said memory of said each battery unit also stores information about characteristics of said storage battery pack, and said charger has means for controlling charge of said storage battery pack, by referring to the information about the characteristics of said storage battery pack stored in said memory of said each battery unit, in accordance with the characteristics.

Claim 12 (previously presented): An electric device according to claim 4, wherein said memory of said each battery unit also stores information about characteristics of said storage battery pack, and said controller has means for controlling discharge from said storage battery pack, by referring to the information about the characteristics of said storage battery pack stored in said memory of said each battery unit, in accordance with the characteristics.

Claim 13 (currently amended): An electric device according to claim 4, wherein said controller has means for displaying a remaining capacity of said storage battery pack of said each battery unit based on the information stored in said each battery unit, and displaying a charge request and/or, giving an alarm, or both when a storage battery pack needing to be charged exists.

Claims 14-15 (canceled)

Claim 16 (currently amended): A method for charging and discharging a battery unit in an electric device comprising: a plurality of battery units detachably mounted thereon, each battery unit constituted by pairing a storage battery pack with a memory for storing at least information about charge and discharge states of the storage battery pack; a driver for driving a load; a controller for controlling supply of electric power from said each battery unit to said driver; and a charger for charging said storage battery pack of said each battery unit,

comprising the steps of:

discharging in order at different times the storage battery packs of said respective mounted battery units, and then charging them by said controller and said charger under the control of said controller, by referring to the information stored in said memories; and

writing into said memory at least the information about charge and discharge states of said storage battery pack in the same battery unit.

Claim 17 (previously presented): A method for charging and discharging the battery unit in the electric device according to claim 16, wherein

the step of discharging and charging is a step of discharging the storage battery packs of said respective mounted battery units in decreasing order of remaining capacity, and charging

them in increasing order of remaining capacity, by said controller and said charger, by referring to the information about charge and discharge states stored in said memories.

Claim 18 (previously presented): A method for charging and discharging the battery unit in the electric device according to claim 16, wherein

the step of discharging and charging is a step of discharging the storage battery packs of said mounted battery units in increasing order of remaining capacity, and charging them when the remaining capacities become a predetermined value or less, by said controller and said charger, by referring to the information about charge and discharge states stored in said memories.

Claim 19 (previously presented): A method for charging and discharging the battery unit in the electric device according to claim 16, further comprising the steps of:

selecting one or more of said battery units by said controller and said charger by referring to the information about charge and discharge states stored in said memories; and

selecting remaining one or more of said battery units by said controller and said charger by referring to the information about charge and discharge states stored in said memories, and wherein

the step of discharging and charging is a step of discharging each of storage battery packs of former selected battery units, and charging each of storage battery packs of latter selected battery units, by said controller and said charger, by referring to the information about charge and discharge states stored in said memories of said mounted battery units.

Claim 20 (previously presented): A method for charging and discharging the battery unit in the electric device according to claim 16, wherein

the step of discharging and charging is a step of discharging in order the storage battery packs of said respective mounted battery units to a predetermined remaining capacity, and then charging them, by said controller and said charger, by referring to the information about charge and discharge states stored in said memories.

Amendments to the Drawings

Enclosed with the presented submission is new Fig. 21 as a separate sheet of the drawings.